For example, claim 8 recites the second separable member as being a detachable panel and claim 12 recites a removable fairing for a truck. Culling describes a hatch or door for a tank or combat vehicle. The Examiner cites column 2, lines 20-24 as disclosing a removable panel, but this portion of the specification states, "Hasp 4 attaches to a second structural member 18, which is typically a hatch cover or door." Hatch covers and doors typically have hinges and are not removable. Culling does not disclose or suggest a removable component.

Claims 8 and 12 are allowable for at least these reasons.

Claim 9 recites that the handle, which is attached to the cam pin, is adapted for carrying the panel when it is separated from the other member. Claims 20 and 21 recite a hand grip having an extension perpendicular to the central axis of the latching pin, and the hand grip being rigidly attached to the latching means. Culling, by contrast, discloses a pin 36 for turning and moving the latch pin. As is apparent from the figures and from the description of Culling's latch being attached to a hatch, the pin 36 in Culling must be small to make the 360 degree turn during latching without interfering with the hatch to which the body 10 is mounted. Although the Examiner asserts that Culling discloses a handle for carrying the hatch, there is no structure cited as capable of performing that function, and clearly the pin 36, which is small in comparison to the latch pin, is not capable of acting as a carrying handle. Even if Culling's hatch cover is removable, which the applicant disputes as being unsupported in the cited patent, and even if Culling has a handle for carrying the hatch, such handle is not part of the latch device. Culling does not disclose or suggest a handle for carrying a detachable panel member or separable member, nor a handle attached to a latch pin for carrying a detachable member.

Claims 9, 20, and 21 are allowable for at least these reasons.

Claim 12 recites a fairing system for removably attaching a fairing to a side of a truck, including a latching means on the fairing and a flange on the truck that is engaged by the latching means to removably latch the fairing to the truck. Culling does not disclose or suggest a fairing or a truck or a fairing system for a removably attaching a fairing to a truck.

Claim 12 is allowable for these additional reasons.

Claims 3, 6, 7, 14, 17, and 19 were rejected under 35 USC § 103(a) as being unpatentable over Culling. The rejection is respectfully traversed.

Claims 3, 14, and 17 recite a cam slot formed in the latching pin guide, the latching pin having a cam pin extending perpendicularly therefrom, the cam pin protruding through and riding in the cam slot. Culling discloses a groove formed in a latch pin having a straight portion and a portion wrapping 360 degrees about the surface of the pin. If the Culling groove were formed in the latching pin guide, this would result in a structurally weak latching pin guide, having a helical slot cut about its full circumference and forming a helical body portion. Culling is concerned with strength and stability of the latch and hatch. As stated at column 1, lines 20-30, the hatch and latch are intended to protect the occupants of a vehicle against explosions, weapons fire and poison gases. The full 360 turn of the groove and the length of the straight portion of the groove in Culling's pin are intended to ensure that the pin is secure in the latch position. Culling would not, therefore, suggest a weak latch pin guide and does not therefore suggest cutting a slot that turns 360 degrees about a pin guide. Further, Culling would not suggest a shorter groove as it would not provide the secure fastening of the full circumference groove.

Claims 3, 14 and 17 are allowable for at least this additional reason.

Claims 7 and 19 recite a cam detent in the latch position in the cam slot. As described in the specification at page 5, lines 1-2, the detent portion prevents unwanted rotation of the cam pin, thus helping secure the latch in the latched position. Culling, on the other hand, fails to disclose or suggest a detent in a cam slot. Culling relies on the frictional engagement of the pin handle 36 with the end of the block to prevent movement of the rod. See column 3, line 54 to column 4, line 3. Engagement of the rod handle with the base is entirely different, in structure and function, from a cam detent that prevents movement of the latch guide pin. Culling uses friction to resist movement of the handle pin 36 to prevent movement of the latch pin. Claims 7 and 19 recite a cam that inhibits movement of the retaining pin in the groove to prevent movement of the latch pin. Culling, accordingly, fails to disclose or suggest a cam detent as claimed.

Claims 7 and 19 are allowable for at least these reasons.

Claims 4 and 18 were rejected under 35 USC § 103(a) as being unpatentable over Culling in view of US Patent No. 6,363,670 to Dewitt. Dewitt discloses a panel for attaching to a window for protection from hurricanes. Pins secure the panel to a window frame. The pins are equipped with springs to bias them to an extended or latched position, but have a J-shaped end that allows them to be turned and secured against the spring force in an open position. This is said to be helpful for manipulating and installing Dewitt's panel because he shows a plurality of latch mechanisms, which would be awkward to handle by one person. Any suggestion for including a biasing spring with a latch appears to be directed to an apparatus having a plurality of sliding latches. Culling does not disclose a plurality of latches, or the need for manipulating a detachable panel.

Culling has a straight length of groove corresponding to the unlatched position and a 360 degree wound portion corresponding to the latched position. Culling's groove has an angle relative to the axial direction that makes it unlikely that a spring could reliably bias the latch pin in the closed position. Further, Culling's earlier US Patent No. 4,997,218, cited as of interest by the Examiner, shows a latch mechanism with a sliding pin biased by a spring to a closed position. Clearly, Culling was aware of biasing springs, but did not see the use for one in the cited '973 patent device.

Accordingly, there is no suggestion to combine the biasing spring disclosed by Dewitt with the rotating latch pin of the cited Culling device.

Claims 4 and 18 are allowable for at least these reasons.

In view of the foregoing, Applicants respectfully request reconsideration and allowance of the claims.

The Examiner is invited to telephone the undersigned if there are any questions about this response, or to help resolve any outstanding issues.

Respectfully submitted,

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